TABLE A-2

Companies in the target population and selected for the sample, by industry and company size: 2019

(Number of companies)

Industry and company size	NAICS code	Companies in target population ^a	Companies selected for the sample		
			All companies	Noncertainties	Certainties
All industries	21-23, 31-33, 42-	1,124,000	45,500	23,000	22,500
Manufacturing industries	31-33	97,000	18,500	8,800	9,600
Food	311	9,300	1,100	750	400
Beverages and tobacco products	312	3,300	350	250	15
Textile, apparel, and leather products	313-16	3,900	550	350	20
Wood products	321	5,000	600	400	20
Paper	322	1,500	350	150	15
Printing and related support activities	323	6,000	1,100	700	40
Petroleum and coal products ^b	324	350	150	20	15
Chemicals	325	5,100	2,000	450	1,60
Basic chemicals	3251	700	300	90	20
Resin, synthetic rubber, and artificial synthetic fibers and filaments	3252	550	200	40	15
Pesticides, fertilizers, and other agricultural chemicals	3253	300	100	20	10
Pharmaceuticals and medicines	3254	1,500	850	100	75
Soap, cleaning compounds, and toilet preparations	3256	800	200	80	15
Paints, coatings, adhesives, and other chemicals	3255, 3259	1,200	350	150	20
Plastics and rubber products	326	4,800	1,000	500	50
Nonmetallic mineral products	327	4,000	500	300	20
Primary metals	331	1,700	450	200	25
Fabricated metal products	332	20,000	2,300	1,400	90
Machinery	333	9,300	2,100	950	1,20
Agricultural implement	33311	500	150	40	10
Semiconductor machinery	333242	90	70	N < 15	7
Engine, turbine, and power transmission equipment	3336	400	150	40	10
Other machinery	other 333	8,300	1,700	850	85
Computer and electronic products	334	4,800	1,800	500	1,30
Communications equipment	3342	550	250	30	20
Semiconductor and other electronic components	3344	1,800	500	200	30
Navigational, measuring, electromedical, and					
control instruments	3345	1,800	800	250	55
Electromedical, electrotherapeutic, and irradiation apparatus	334510, 334517	300	200	40	15
Search, detection, navigation, guidance, aeronautical, and nautical systems and					
instruments	334511	250	150	N < 15	
Other measuring and controlling devices	other 3345	1,300	450	200	
Other computer and electronic products	other 334	600	250	40	
Electrical equipment, appliances, and components	335	2,300	650	350	
Transportation equipment	336	4,700	1,100	350	75
Motor vehicles, bodies, trailers, and parts	3361-63	3,000	600	200	40
Aerospace products and parts	3364	800	250	50	
Aircraft, aircraft engine, and aircraft parts	336411-13	800	200	50	15
Guided missiles, space vehicles, and related parts	336414, 336415, 336419	50	40	0	4
Military armored vehicles, tanks, and tank components	336992	30	20	0	20
Other transportation equipment	other 336	900	200	90	

TABLE A-2

Companies in the target population and selected for the sample, by industry and company size: 2019

(Number of companies)

Industry and company size	NAICS code	Companies in target population ^a	Companies selected for the sample		
			All companies	Noncertainties	Certainties
Furniture and related products	337	4,500	900	500	400
Miscellaneous manufacturing	339	6,500	1,300	650	650
Medical equipment and supplies	3391	2,300	600	200	350
Other miscellaneous	3399	4,200	700	400	300
Unclassified	_	50	50	0	50
Nonmanufacturing industries	21-23, 42-81	1,027,000	27,000	14,500	13,000
Mining, extraction, and support activities ^b	21	5,100	600	300	300
Utilities	22	800	200	40	150
Wholesale trade	42	68,000	5,800	4,200	1,600
Electronic shopping and electronic auctions	454111-12	3,500	350	250	100
Transportation and warehousing	48-49	34,500	550	200	350
Information	51	15,500	3,100	1,200	1,900
Publishina	511	5,000	1,200	500	700
Newspaper, periodical, book, and directory	5111				
publishers	5111	2,600	450 750	250 250	150 500
Software publishers Telecommunications	517	2,400	500	300	200
	-	2,500			
Data processing, hosting, and related services Other information	518	3,100	950	250	750
	other 51	4,900	500	250	250
Finance and insurance	52	26,000	850	200	650
Real estate and rental and leasing	53	26,000	450	150	300
Lessors of nonfinancial intangible assets (except copyrighted works)	533	450	90	N < 15	90
Other real estate and rental and leasing	other 53	25,500	350	150	250
Professional, scientific, and technical services	54	103,000	9,800	4,200	5,500
Architectural, engineering, and related services	5413	17,500	2,700	1,700	1,000
Computer systems design and related services	5415	16,500	3,100	1,800	1,200
Scientific research and development services	5417	2,400	2,400	0	2,400
Biotechnology research and development	541711	600	600	0	600
Physical, engineering, and life sciences (except biotechnology) research and development	541712	1,600	1,600	0	1,600
Social sciences and humanities research and development	541720	150	150	0	150
Other professional, scientific, and technical	011720	.00			
services ^c	other 54	66,500	1,600	700	950
Health care services	621-23	112,000	1,400	550	850
Treatiti dare del rideo	23, 44-45 (excluding 454111- 12), 55-56, 624,	112,000	1,100	000	000
Other nonmanufacturing	71-72, 81	633,000	4,000	2,900	1,100
Unclassified	_	350	150	N < 15	150
Company size (number of domestic employees)					
All companies	-	1,124,000	45,500	23,000	22,500
< 10 ^d	_	8,000	450	150	300
10-19	_	557,000	10,000	7,800	2,200
20-49	_	360,000	10,500	7,300	3,300
50-99	_	108,000	7,000	3,800	3,100
100-249	_	58,000	7,400	2,800	4,600
250-499	_	17,000	3,900		3,100

TABLE A-2

Companies in the target population and selected for the sample, by industry and company size: 2019

(Number of companies)

			Companies selected for the sample		
Industry and company size	NAICS code	Companies in target population ^a	All companies	Noncertainties	Certainties
500-999	-	7,900	2,500	250	2,200
1,000-4,999	_	6,400	2,700	150	2,500
5,000-9,999	_	900	550	20	500
10,000-24,999	_	550	400	N < 15	400
25,000 or more	_	350	250	N < 15	250

NAICS = 2012 North American Industry Classification System.

Note(s):

Beginning in survey year 2019, counts reflect a change in rounding methodology. Detail may not add to total because of rounding. Certainties are companies whose probability of selection is 1 based on prior year R&D expenditures equal to or greater than \$3 million as well as others included in the sample for analytical purposes (analytical certainties). Noncertainties are companies whose probability of selection is less than 1. Companies that were missing or had an incomplete NAICS code at the time of sampling were assigned to an "unclassified" industry category temporarily. If an unclassified company reported R&D expenditures, its primary industrial activity was investigated, and a NAICS code was assigned during statistical processing.

Source(s):

National Center for Science and Engineering Statistics and Census Bureau, Business Enterprise Research and Development Survey, 2019.

^a Estimates of the number of companies in the target population are based on the original sampling frame that was created to select the 2019 Business Enterprise Research and Development (BERD) Survey sample. These estimates do not include 150 R&D performers from the previous year's sample, which were not on the original sampling frame but were found during the survey's annual contact update procedures. These companies were added to the 2019 sample with certainty but are not reflected in the number of certainties selected for the sample.

^b Because of the widespread practice of the larger petroleum extraction and refining companies vertically integrating their activities, petroleum refineries (NAICS 32411) and oil and gas extraction (NAICS 211) were combined during sampling.

^c Contains companies classified in scientific research and development services (NAICS 5417) that, as of sampling, were not fully classified to the level of detail in biotechnology research and development (NAICS 541711), physical, engineering, and life sciences research and development (NAICS 541712), or social sciences and humanities research and development (NAICS 541720).

^d This category includes companies that are represented on the sampling frame as having missing data, but these companies are in scope to the BERD Survey because they have at least \$500,000 in annual payroll.